carcinoma.

- 16. The method of Claim 13 wherein the cancer is a sarcoma.
- 17. The method of Claim 13 wherein the cancer is selected from the group consisting of fibrosarcoma, synovial sarcoma, colon carcinoma, breast carcinoma, prostate carcinoma, lung carcinoma, cervical carcinoma, neuroblastoma, glioblastoma, and melanoma.
- 18. The method of Claim 13 wherein the cancer is selected from the group consisting of colon carcinoma, breast carcinoma, prostate carcinoma, lung carcinoma and glioblastoma.
- 19. The method of Claim 13 wherein at least 4  $\times$   $10^8$  PFU of the virus are administered to the mammal per kilogram of body weight of the mammal.
- 20. The method of Claim 13 wherein the virus is administered systemically.
- 21. The method of Claim 20 wherein at least 4 x  $10^9$  PFU of the virus are administered to the mammal per kilogram of body weight of the mammal.
- 22. The method of Claim 14 wherein the virus is administered at the tumor site.
- 23. The method of Claim 13 wherein the virus is a mesogenic strain of Newcastle Disease Virus.

- 24. The method of Claim 23 wherein the virus is Newcastle Disease Virus strain M.
- 25. A method of treating cancer in a mammal comprising administering to the mammal Newcastle Disease Virus and a chemotherapeutic compound, both being administered in sufficient amounts so that the combination is effective against the cancer.
- 26. The method of Claim 25 wherein the compound is a retinoic acid.
- 27. A method of detecting cancer cells in a mammal comprising administering Newcastle Disease Virus to the mammal and detecting the virus bound to the cancer cells.
- 28. The method of Claim 27 wherein the virus is labeled with a detectable label.
- 29. The method of Claim 27 wherein a labeled component that specifically binds to the virus is administered to the mammal to allow for detection of the virus bound to the cancer cells.
- 30. An imaging agent for detecting cancer comprising Newcastle Disease Virus labeled with a detectable label.
- 31. The imaging agent of Claim 30 wherein said detectable label is a radioisotope.
- 32. A method of detecting cancer cells in a mammal comprising administering Newcastle Disease Virus to the

mammal and subsequently measuring the quantity of said virus in the body fluids or tissue of the mammal as an indication of the presence of cancer cells in the mammal.

- 33. An article of manufacture, comprising:
  - a container;
  - a label on said container; and
- a composition contained within said container; wherein:

the composition is effective for treating and detecting cancer in a mammal having cancer,

the label on said container indicates that the composition can be used for treating and detecting cancer, and

the active agent in said composition comprises Newcastle Disease Virus.

- 34. The article of manufacture of Claim 33 wherein said label on said container further indicates directions for the in vitro and/or in vivo use of said composition.
- 35. The article of manufacture of Claim 33 wherein the virus is a mesogenic strain of Newcastle Disease Virus.
- 36. The article of manufacture of Claim 35 wherein the virus is Newcastle Disease Virus strain M.--

## REMARKS

This paper is being filed in response to the Office Action dated January 4, 1995. After the above amendments, Claims 13-36 are pending in the case.